

NASA TECH BRIEF



NASA Tech Briefs are issued to summarize specific innovations derived from the U.S. space program, to encourage their commercial application. Copies are available to the public at 15 cents each from the Clearinghouse for Federal Scientific and Technical Information, Springfield, Virginia 22151.

Structural Thermal-Control Coatings

Specifications have been developed for the formulation and application of thermal-control paints on large radar antenna structures exposed to solar radiation to (1) minimize thermally induced mechanical deflections of the structures and overheating of associated components and subsystems; and (2) reduce or eliminate the focusing and resultant glare of incident solar radiation at the focal points of various curved surfaces on these structures. Secondary purposes of these thermal-control paints or coatings are to protect the surfaces against corrosion and improve their appearance. The coatings can also be used to improve temperature control of buildings and amphitheaters, gas and oil storage tanks and transportation vehicles.

The specifications include criteria for obtaining the required dry-film thickness, reflectivity, spectral

gloss values, adherence, and durability of the applied coatings.

Note:

Documentation for the innovation is available from:
Clearinghouse for Federal Scientific
and Technical Information
Springfield, Virginia 22151
Price \$3.00
Reference: B68-10553

Patent status:

No patent action is contemplated by NASA.

Source: F. W. Stoller
Jet Propulsion Laboratory
(NPO-10785)

Category 03